

LISTING OF CLAIMS:

1. (Previously Presented) A disk of a disk rotor for a gas turbine comprising:
a central portion having a central axis pass-through hole, a first collar situated at a first end and a second collar situated at a second end of the central portion;
an intermediate portion disposed around the central portion;
an outer portion disposed around the intermediate portion, the outer portion having a series of axial pass-through holes configured to receive a series of tie rods and having a series of slots configured to house a corresponding series of vanes, wherein the series of holes is positioned in the outer portion of the disk so as to obtain high dynamic characteristics of the rotor and at the same time a sufficient useful life thereof, and
each slot has a reference point for placing a corresponding vane, an angle between the reference point of a slot and a central point of an adjacent hole of the series of holes is between 2 and 10 sexagesimal degrees, and the reference point is defined by an intersection of (i) an axis of the slot in a middle side section of the disk with (ii) an extension of a side surface of the outer portion, the axis of the slot being radial from an axial direction of the disk.
2. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein said series of holes is situated on a base surface of the outer portion.

3. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 2, wherein the holes of said series of holes are positioned at an equal distance from each other along a circumference lying on the base surface, said circumference being coaxial with the axial direction of the disk.

4. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein said first collar comprises a bevel and a relief and said second collar comprises a bevel and a relief.

5. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein the disk has a total number of holes of the series of holes which is equal to the total number of slots of the series of slots for the series of vanes.

6. (Cancelled).

7. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein said angle ranges from 4 to 8 sexagesimal degrees.

8. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 3, wherein the diameter of the circumference is close to the diameter of the disk.

9. (Previously Presented) A disk rotor for a compressor comprising a series of disks according to claim 1 and also comprising a series of tie rods, and a series of vanes.

10. (Cancelled).

11. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein each slot of the series of the slots is tilted both axially and vertically relative to axial and vertical directions of the disk.

12. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, further comprising:

the series of vanes, wherein a center of each vane is placed to coincide with the reference point of a corresponding slot.

13. (Previously Presented) The disk of a disk rotor for a gas turbine according to claim 1, wherein each vane extends along an axis within a corresponding slot that is different from the axial direction.

14. (Previously Presented) A disk of a disk rotor comprising:

a central portion having a central axis pass-through hole;
an intermediate portion disposed around the central portion;
an outer portion disposed around the intermediate portion, the outer portion having a series of axial pass-through holes and a series of slots in a side surface of the outer portion, wherein

each slot has a reference point for placing a corresponding vane, an angle between the reference point of a slot and a central point of an adjacent hole of the series of holes is between 2 and 10 sexagesimal degrees, and the reference point is defined by an intersection of an axis of the slot in a middle side section of the disk with an extension of the side surface of the outer portion, the axis of the slot being radial from an axial direction of the disk.

15. (Previously Presented) The disk of a disk rotor according to claim 14, wherein each slot of the series of the slots is tilted both axially and vertically relative to axial and vertical directions of the disk.

16. (Previously Presented) The disk of a disk rotor according to claim 14, further comprising:

a series of vanes configured to be attached to the series of slots.

17. (Previously Presented) The disk of a disk rotor according to claim 16, wherein a center of each vane is placed to coincide with the reference point of each slot.

18. (Previously Presented) The disk of a disk rotor according to claim 14, wherein the central portion further comprises:

a central axis pass-through hole;

a first collar situated at a first end of the central portion; and

a second collar situated at a second end of the central portion.

19. (Previously Presented) The disk of a disk rotor according to claim 18, wherein a diameter of the first collar is smaller than a diameter of the second collar.

20. (Previously Presented) The disk of a disk rotor according to claim 18, wherein the first collar fits inside the second collar.

21. (Previously Presented) The disk of a disk rotor according to claim 14, wherein the disk is part of a gas turbine.

22. (Previously Presented) The disk of a disk rotor according to claim 14, further comprising:

a series of vanes, wherein each vane extends along an axis within a corresponding slot that is different from the axial direction.